

In the Claims:

This listing of claims replaces all prior versions, and listings, of claims in the application.

1. (Currently Amended) A pulse wave measuring apparatus for measuring a pulse wave when pressed against a living body, comprising:

a substrate $[(1)]$ having ~~pressure sensing means (3)~~ a pressure sensor on a main surface;
and

a protection member $[(12)]$ having an accommodation space accommodating said substrate ~~(1), the pulse wave measuring apparatus serving to measure a pulse wave by pressing said substrate (1) against a living body;~~

wherein a wall surface $[(20a)]$ of said protection member $[(12)]$ forming said accommodation space is arranged such that an air chamber $[(20)]$ is interposed between said wall surface and an end surface of said substrate $[(1)]$.

2. (Currently Amended) The pulse wave measuring apparatus according to claim 1, wherein said air chamber $[(20)]$ is provided around an entire perimeter of said substrate $[(1)]$.

3. (Currently Amended) The pulse wave measuring apparatus according to claim 1, wherein said air chamber $[(20)]$ is open to atmosphere.

4. (Currently Amended) The pulse wave measuring apparatus according to claim 1, further comprising a circuit board $[(26)]$ processing a signal, and a flexible line $[(18)]$ transmitting a signal output from said ~~pressure sensing means (3)~~ pressure sensor to said circuit board $[(26)]$,
wherein

said flexible line $[(18)]$ includes a fixed portion $[(18a)]$ fixed to said protection member $[(12)]$, a connection portion $[(18b)]$ connected to said substrate $[(1)]$, and a ~~loosened~~ loose portion $[(18c)]$ located between said fixed portion $[(18a)]$ and said connection portion $[(18b)]$.

5. (Currently Amended) The pulse wave measuring apparatus according to claim 4, wherein said loosened portion $[(18c)]$ is located inside said air chamber $[(20)]$.

6. (Currently Amended) The pulse wave measuring apparatus according to claim 1, further comprising a circuit board [(26)] processing a signal, and a flexible line [(18)] transmitting a signal output from said ~~pressure sensing means (3)~~ pressure sensor to said circuit board [(26)], wherein

said flexible line [(18)] includes a fixed portion [(18a)] fixed to said protection member [(12)] and a connection portion [(18b)] connected to said substrate [(1)], and

a portion [(18d)] having rigidity different from that of another portion of said flexible line [(18)] is located between said fixed portion [(18a)] and said connection portion [(18c)] of said flexible line [(18)].

7. (Currently Amended) The pulse wave measuring apparatus according to claim 1, further comprising a protection film [(16)] covering said main surface of said substrate [(1)] and said air chamber [(20)], and

an attachment means (42) mechanism configured for fastening a peripheral portion of said protection film [(16)] to an outer circumferential wall of said protection member [(12)] for attachment.

8. (Currently Amended) The pulse wave measuring apparatus according to claim 7, wherein said protection member [(12)] has a substantially circular outer shape when viewed from a direction orthogonal to said main surface of said substrate [(1)], and

said attachment ~~means (42)~~ mechanism is an O ring.

9. (Currently Amended) The pulse wave measuring apparatus according to claim 8, wherein said outer circumferential wall of said protection member [(12)] has a concave fitting portion [(47)] fitting to an inner portion of said O ring [(42)] on an entire circumference, and

an outer portion of said O ring [(42)] projects from said outer circumferential wall of said protection member [(12)].

10. (Currently Amended) The pulse wave measuring apparatus according to claim 7, wherein said protection film [(16)] and said attachment ~~means (42)~~ mechanism are integrally formed.

11. (Currently Amended) The pulse wave measuring apparatus according to claim 7, wherein said protection film [(16)] has a collar portion [(16a)] in said peripheral portion.

12. (Currently Amended) The pulse wave measuring apparatus according to claim 1, wherein said protection member [(12)] includes an inner frame body [(44)] containing said accommodation space and an outer frame body [(46)] fitted to said inner frame body [(44)] so as to enclose an outer wall of said inner frame body [(44)],

said outer frame body [(46)] has a protection film portion [(46d)] covering said main surface of said substrate [(1)] and said air chamber [(20)], and

an outer circumferential wall of said outer frame body [(46)] has a projected portion [(46c)] on its entire circumference.

13. (Currently Amended) The pulse wave measuring apparatus according to claim 1, further comprising a circuit board [(26)] processing a signal, and a flexible line [(18)] transmitting a signal output from said ~~pressure sensing means (3)~~ pressure sensor to said circuit board [(26)],

wherein said protection member [(12)] includes an inner frame body [(44)] containing said accommodation space and an outer frame body [(46)] fitted to said inner frame body [(44)] so as to enclose an outer wall of said inner frame body [(44)], and

said flexible line [(18)] is inserted between said inner frame body [(44)] and said outer frame body [(46)].

14. (Currently Amended) The pulse wave measuring apparatus according to claim 13, wherein said outer frame body [(46)] has an overhanging portion [(46a)] ~~provided so as to project~~ projecting from an inner surface of said outer frame body [(46)] and facing, ~~[[with]]~~ at a

distance, a perimeter of an accommodation space forming surface of said inner frame body [(44)] where said accommodation space is formed, and

said flexible line [(18)] inserted between said inner frame body [(44)] and said outer frame body [(46)] is protected by said overhanging portion [(46a)].

15. (Canceled)

16. (Currently Amended) The pulse wave measuring apparatus according to claim [(15)] 1, wherein said protection member [(12)] is electrically connected to a ground potential.

17. (Currently Amended) The pulse wave measuring apparatus according to claim 16, further comprising a circuit board [(26)] processing a signal, and a flexible line [(18)] transmitting a signal output from said ~~pressure sensing means (3)~~ pressure sensor to said circuit board [(26)],

wherein said protection member [(12)] is electrically connected to the ground potential by ~~means of~~ said flexible line [(18)].

18. (Currently Amended) The pulse wave measuring apparatus according to claim 1, wherein said protection member [(12)] is formed ~~of~~ with a metal material or a ceramic material.

19. (Currently Amended) The pulse wave measuring apparatus according to claim 1, wherein said protection member [(12)] has a plurality of small irregularities on its surface.

20.-29. (Canceled)